

Long Term Care in Maryland: A POCKET CHARTBOOK, 2005



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Maryland Health Care Commission
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Baltimore, Maryland 21215
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MARYLAND
HEALTH CARE
COMMISSION

Introduction

This booklet contains charts and tables derived from analysis of several data sources. Unless otherwise stated, the data presented represent Maryland nursing homes only. The data shown primarily represent statistics from the Centers for Medicare and Medicaid Services (CMS) Minimum Data Set (MDS) as reported by Maryland nursing homes. Additional data were obtained from the Maryland Health Care Commission's Long Term Care Surveys and from Spatial Insights. Data not specific to Maryland were obtained as follows:

- 1) U.S. Department of Health and Human Services, Centers for Disease Control and Prevention, National Center for Health Statistics;
- 2) "Nursing Facilities, Staffing, Residents and Facility Deficiencies, 1997-2003", Department of Social and Behavioral Sciences, University of California San Francisco; and
- 3) U.S. Census Bureau.

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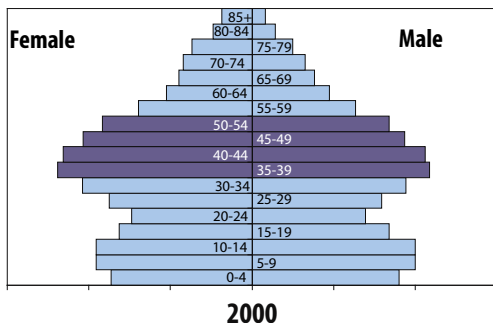
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Chartbook

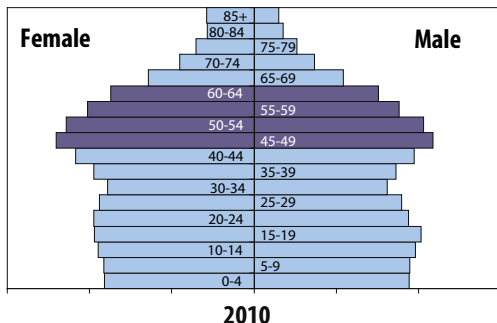


Aging of Maryland's Baby Boom Population

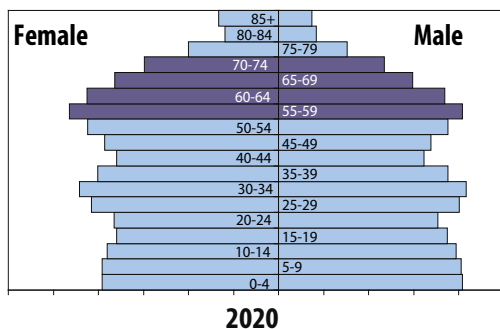
The baby boom generation, represented by the dark bars, are those individuals born between 1946 and 1964.



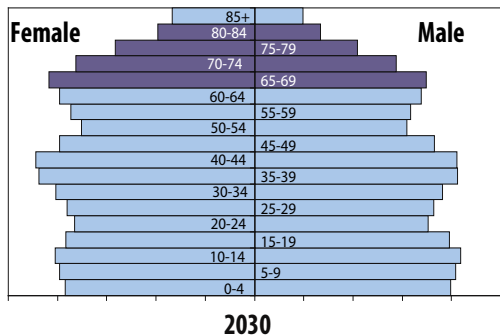
The first baby boomers will reach the age of 65 in the year 2010.



Source: Maryland Department of Planning, Population Estimates and Projections, May 2004.



Women are over-represented in the 65+ age group 58 percent to 42 percent in the year 2000. By 2020, women are over-represented 52 percent to 48 percent in the 65+ age group.



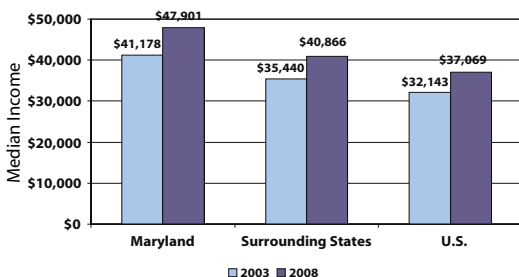
While the 65+ population represented 11 percent of the total population in 2000, it will represent 20 percent of the total population in 2030.



Income of the 65+ Age Group: Maryland, Surrounding States, and U.S., 2003 and 2008

Median income of Maryland residents 65 and older exceeds that of surrounding states in 2003 and projected to 2008 by 28 percent and 29 percent, respectively.

Source: Spatial Insights, 2004
Note: States surrounding Maryland include Pennsylvania, Virginia, West Virginia, Delaware, and D.C..



Income Distribution of the 65+ Age Group: Maryland and U.S., 2003

The 65+ population in Maryland typically has a higher income than the same age cohort in the U.S. The 2003 U.S. poverty threshold for a household of two persons 65+ years was \$11,133. The threshold for an individual aged 65+ was \$8,825.

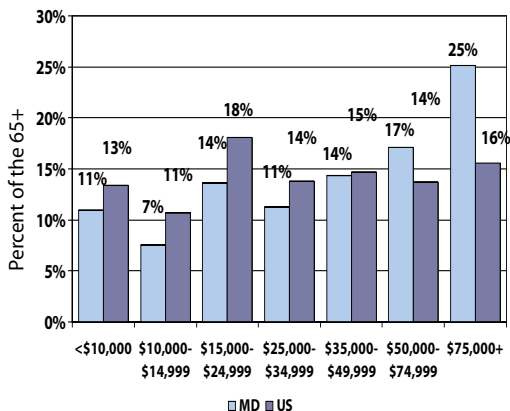
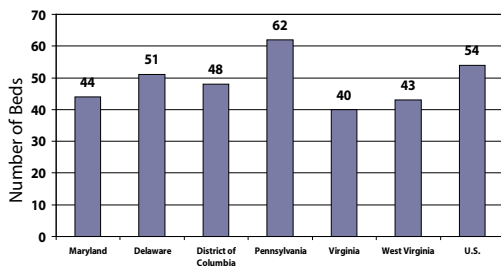


Chart Source: Spatial Insights, 2003
Text Source: U.S. Census Bureau, Current Population Survey, 2002 to 2004 Annual Social and Economic Supplements.



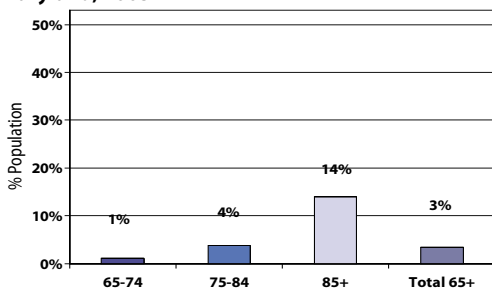
Nursing Home Beds per 1,000 Population (65+): Maryland, Surrounding States, and U.S., 2001



Nursing home beds per 1,000 population 65 years and older in Maryland are lower than adjacent states, except for Virginia and West Virginia.

Source: AARP; Across the States 2002, Profiles of Long Term Care; <http://www.aarp.org/research/reference/statistics/Articles/aresearch-import-643-D17794.html>

Percent of Elderly in Nursing Homes: Maryland, 2003



About one percent of Maryland's population between the ages of 65 to 74 were in a nursing home in 2003. Four percent of the population between the ages of 75 to 84, and 14 percent of individuals over 85 years of age were in a nursing home.



Maryland Nursing Home Bed Inventory as of January 1, 2005

Jurisdiction	Licensed Beds	CON Approved	Waiver Beds	Temporarily Delicensed	Total Beds	Facilities
Allegany	915	0	26	20	961	9
Carroll	942	0	10	0	952	10
Frederick	1,062	1	0	20	1,083	11
Garrett	279	0	9	20	308	4
Washington	1,150	0	6	89	1,245	11
Montgomery	4,709	0	60	114	4,883	35
Calvert	296	0	0	0	296	4
Charles	429	0	0	12	441	3
Prince George's	2,870	0	25	0	2,895	21
St. Mary's*	322	0	0	15	337	2
Anne Arundel	1,733	0	60	22	1,815	15
Baltimore Co.	5,594	70	173	387	6,224	48
Baltimore City	4,287	5	41	220	4,533	34
Harford	703	0	14	0	717	6
Howard	495	63	10	0	568	3
Caroline	205	0	0	0	205	2
Cecil	416	9	10	30	465	3
Dorchester	258	0	0	0	258	2
Kent	214	0	0	0	214	3
Queen Anne's	150	0	0	0	150	1
Somerset	204	0	3	0	207	2
Talbot	344	0	0	0	344	3
Wicomico	643	0	0	0	643	5
Worcester	319	2	0	23	344	3
Total	28,539	150	447	972	30,108	240

**Excludes Charlotte Hall Veterans Home*



Helpful Bed Inventory Facts:

Certificate of Need (CON)

CON Approved beds are beds that have been approved by the Commission for development, but are not yet operational. The State Health Plan for Long Term Care Services forecasts the future need for nursing home beds in each Maryland jurisdiction.

Waiver Beds

Waiver beds (10 beds/10%) are beds that a facility may request that are not subject to CON approval. The number of beds requested must be either 10 beds or 10 percent of the facility's current licensed capacity, whichever is less. Waiver beds may only be granted two years after a change in licensed capacity.

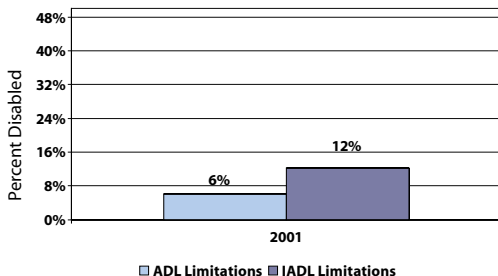
Temporarily Delicensed Beds

- Beds may be temporarily delicensed under the provisions of COMAR 10.24.03C.
- Temporarily delicensed beds are beds that a facility has requested the Commission to remove from the inventory on a temporary basis up to one year. These beds are retained on the facility's license during the period of temporary delicensure until the plans for the beds are determined.
- During the time period between 1997 through 2004, 2,587 temporarily delicensed beds were relinquished or abandoned.



Disability in the 65+ Household Population: United States, 2001

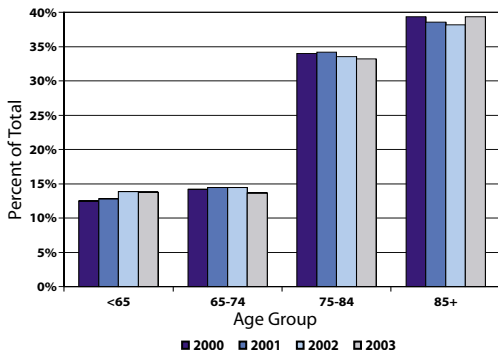
Six percent of individuals 65 + years of age had a limitation in Activities of Daily Living (ADLs), while 12 percent had a limitation in Instrumental Activities of Daily Living (IADLs). In general, disability rates for the 65+ population have been declining since 1997.



Health, United States, 2004; National Center for Health Statistics, p. 215
 ADLs include: bathing, dressing, eating, toileting, and mobility.
 IADLs include: light housework, laundry, meal preparation, transportation, grocery shopping, telephone, medication management, money management.

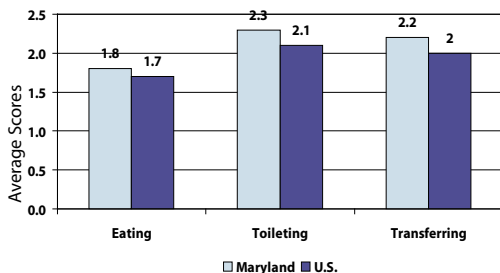
Trends in Age Distribution of Nursing Home Residents: Maryland, 2000 - 2003

Although there has been minor fluctuation, the age distribution of Maryland nursing home residents has been largely stable. About two-thirds of nursing home residents were 75 and older. The median age of Maryland nursing home residents on admission was 82. The mean was 79.





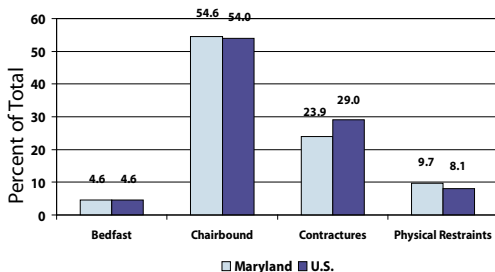
Dependency in Selected Activities of Daily Living: Maryland and United States, 2003



A comparison of dependency in activities of daily living scores* of nursing home residents in Maryland and the U.S. shows that residents in Maryland were more dependent than U.S. residents in general for eating, toileting, and transferring.

**Average ADL scores are based on a scale of 1 to 3 from "needs little assistance" to "needs extensive assistance". See Appendix.*

Nursing Home Residents Who are Bedfast, Chairbound, Physically Restrained, or Have Contractures: Maryland and United States, 2003



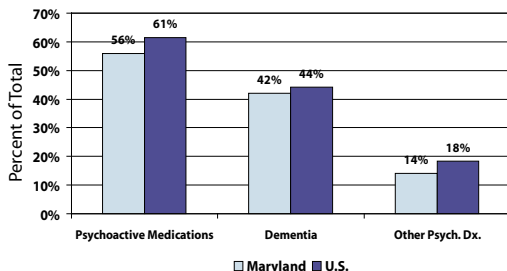
There is no difference between Maryland and the U.S. in the percent of nursing home residents who were bedfast. However, slightly more Maryland nursing home residents were chairbound and were physically restrained than the U.S. A notably higher percentage of U.S. nursing home residents have contractures than in Maryland.

Source: Data were based on OSCAR and are from "Nursing Facilities, Staffing, Residents and Facility Deficiencies, 1997-2003", Department of Behavioral Sciences; University of California San Francisco. Contractures refer to a permanent muscular contraction due to tonic spasm or fibrosis, or to loss of muscular equilibrium, resulting in paralysis.



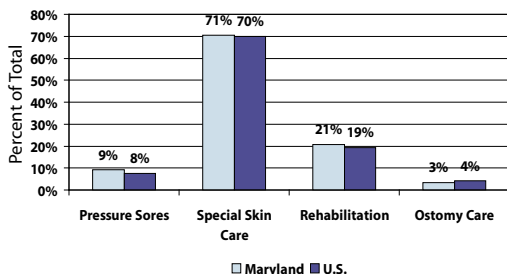
Nursing Home Residents on Psychoactive Medications and/or with Dementia and Other Psychiatric Diagnoses: Maryland and United States, 2003

A little more than one of every two nursing home residents in Maryland received psychoactive medications in 2003. The percentage of residents in nursing homes with mental disorders and psychoactive medications was higher in the U.S. as a whole than in Maryland.



Nursing Home Residents with Pressure Sores, Special Skin Care, Rehabilitation, and Ostomy Care: Maryland and United States, 2003

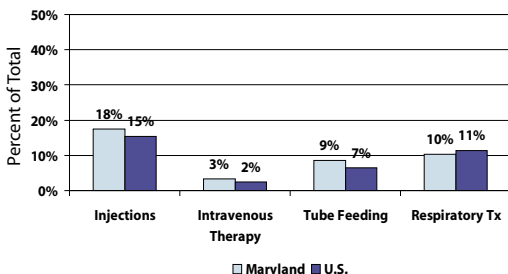
The percentage of residents having pressure sores, receiving special skin care, and rehabilitation services was slightly higher in Maryland than in the U.S. Residents receiving ostomy care was slightly higher in the U.S.



Source: Data were from "Nursing Facilities, Staffing, Residents and Facility Deficiencies, 1997-2003", Department of Behavioral Sciences, University of California San Francisco.

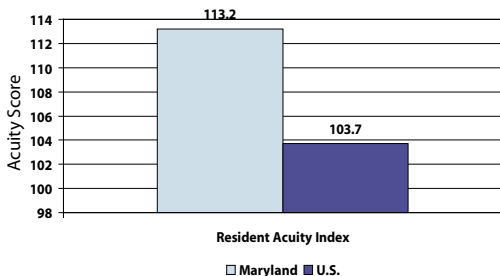


Nursing Home Residents Receiving Injections, IV Therapy, Tube Feeding, or Respiratory Treatments: Maryland and United States, 2003



The percentage of nursing home residents receiving injections, IV therapy, and tube feeding in Maryland was higher than the U.S. The percentage of residents receiving respiratory treatments was slightly lower in Maryland.

Acuity Index* Scores of Nursing Home Residents: Maryland and United States, 2003



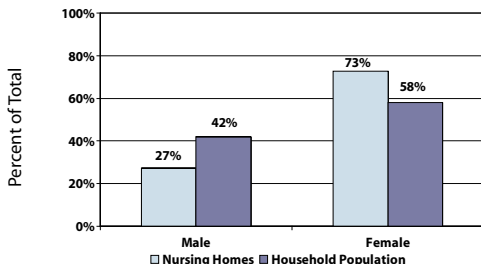
A comparison of Maryland and U.S. nursing home residents in terms of patient acuity shows that Maryland residents were at a higher acuity level than nursing home residents in the U.S. as a whole.

**Facility-specific index by state that summarizes OSCAR data to indicate average resident acuity at the State level. See Appendix.*



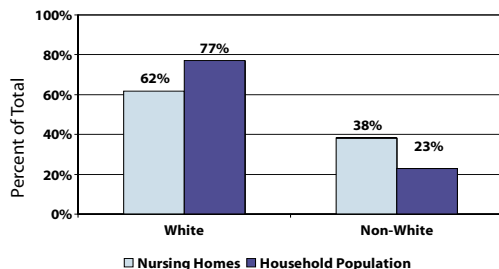
Proportion of the 65+ Population by Gender in Maryland Nursing Homes and in the Community: Maryland, 2003

Although women 65 and older out-number men both in the community and in nursing homes, the proportion of older women in nursing homes was greater than in the general community as measured by household population.



Proportion of the 65+ Population by Race in Maryland Nursing Homes and in the Community: Maryland, 2003

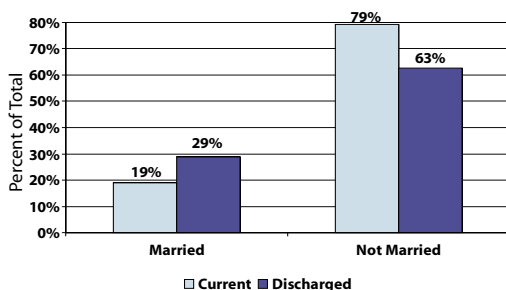
The non-white 65 and older population represented a larger proportion of nursing home residents than they represented in the community as measured by household population.



Note: Nursing home data were from the 2003 Minimum Data Set; household population data were from the Maryland Department of Planning, May 2004 population projections for 2005.



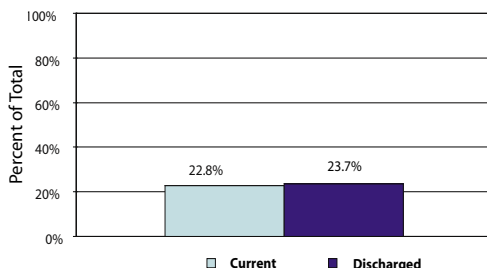
Proportion of Current Residents and Discharged Residents of Nursing Homes by Marital Status: Maryland, 2003



NOTE: The "not married" category includes individuals who were never married, widowed, separated, or divorced.

Individuals who were current residents of nursing homes were less likely to be married than individuals who were discharged. This may be because individuals who were married were more likely to have support that allowed them to return to the community.

Proportion of Current and Discharged Nursing Home Residents who Lived Alone: Maryland, 2003

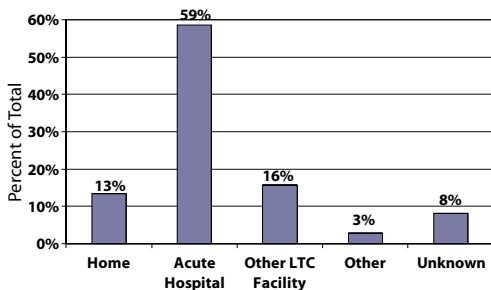


Residents who lived alone before admission to a nursing home were almost equally likely to be discharged as not. In other words, whether or not a resident lived alone prior to admission seems to have little or no effect on the likelihood of discharge.



Distribution of Nursing Home Residents by Admission Source: Maryland, 2003

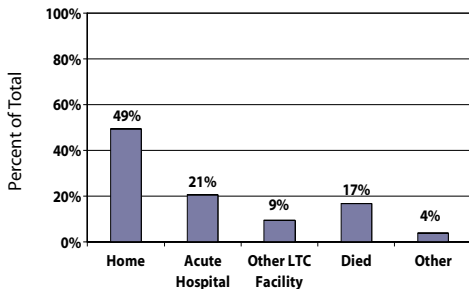
Almost 60 percent of nursing home residents were admitted from an acute care hospital. Thirteen percent were admitted from home, 16 percent from another long term care facility, and three percent from other locations.



Unknown includes residents for whom there is no face sheet information from the Minimum Data Set.

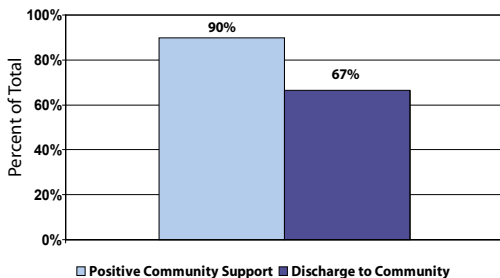
Distribution of Nursing Home Residents by Discharge Destination: Maryland, 2003

Nearly 50 percent of discharges from Maryland nursing homes went home, either with or without home health care. Twenty-one percent of discharges went to an acute care hospital, nine percent to another long term care facility, and 17 percent die. Only four percent went to another setting.



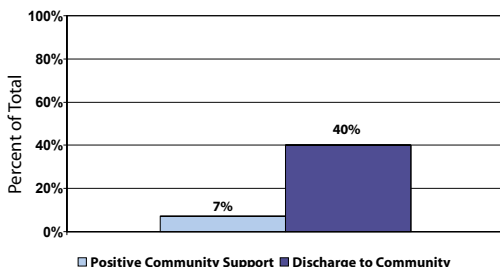


Discharge to Community and Positive Family Support: Residents Desiring Community Discharge; Maryland, 2003



Of those nursing home residents who, when admitted, expressed a desire to be discharged to the community, about 90 percent had someone in the community to help them. About 67 percent of residents wanting discharge to the community were actually discharged to a community setting.

Discharge to Community and Positive Family Support: Residents Not Desiring Community Discharge; Maryland, 2003



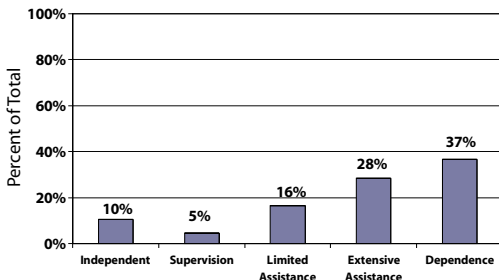
Nursing home residents who, when admitted, did not express a desire to return to the community were less likely to have someone in the community who supported a return to the community (seven percent). About 40 percent of these residents were discharged to the community.



Percent Distribution of Nursing Home Residents by Activities of Daily Living: Maryland, 2003

Thirty-seven percent of nursing home residents were dependent on staff for toileting on admission to the facility. Twenty-eight percent required extensive assistance and 16 percent required limited assistance. Only 10 percent were able to toilet themselves independently.

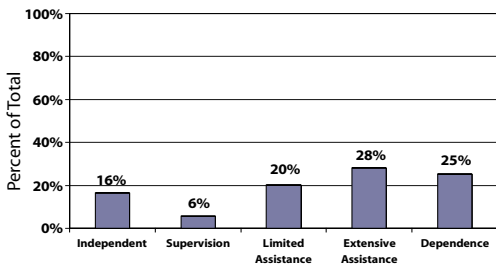
Toileting on Admission: Maryland, 2003



About four percent are unknown

Twenty-five percent of nursing home residents were dependent in transfer ability on admission to a nursing facility. Twenty-eight percent required extensive assistance, 20 percent required limited assistance, and 16 percent required no assistance.

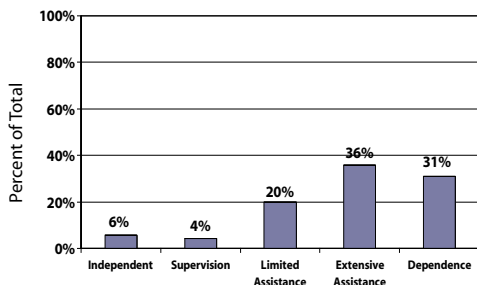
Transfer on Admission: Maryland, 2003



About four percent are unknown



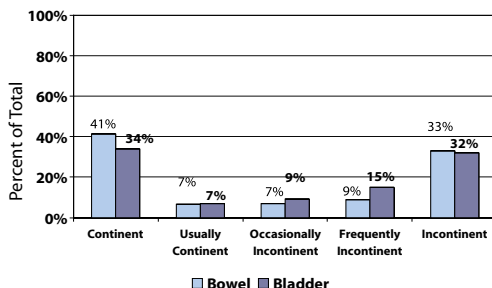
Dressing on Admission: Maryland, 2003



About three percent are unknown

Thirty-one percent of nursing home residents were dependent on staff for dressing on admission to the facility. Thirty-six percent required extensive assistance, 20 percent required limited assistance, and only six percent were independent in dressing.

Continence of Bladder and Bowel on Admission: Maryland, 2003



About three percent are unknown

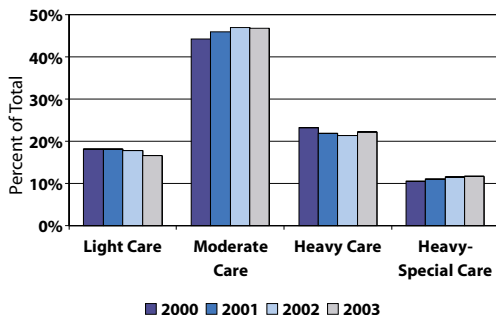
In most cases, a higher proportion of nursing home residents were incontinent of bladder than of bowel. On admission to a nursing home, 41 percent of residents were continent of bowel and 34 percent were continent of bladder.



Trends in Degree of Care on Admission: Maryland, 2003

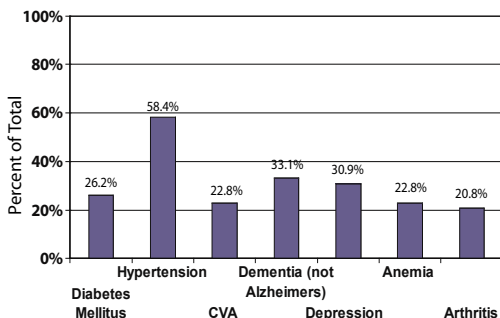
There was a slight increase in the percentage of moderate care and heavy-special care residents admitted to nursing homes between 2000 and 2003.

Based on MHCC analysis of MDS data using resident-specific ADLs and treatments.



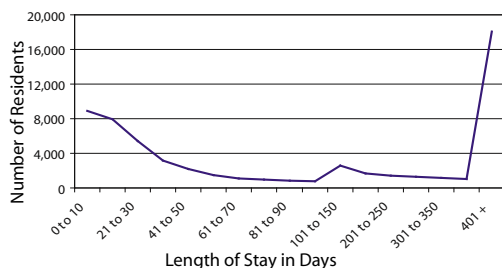
Diagnoses on Admission: Maryland, 2003

The most frequently reported diagnosis on admission to a Maryland nursing home was hypertension (over 58 percent). Other admitting diagnoses occurring in more than 20 percent of residents were diabetes mellitus, cerebral vascular accident (CVA), non-Alzheimer's dementias, depression, anemia and arthritis.



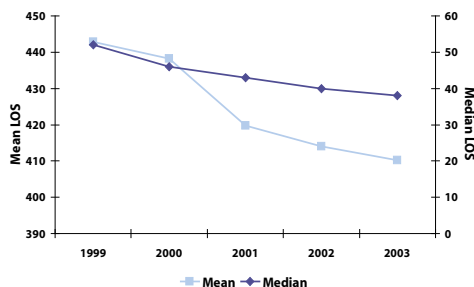


Length of Stay Distribution in Nursing Homes: Maryland, 2003



Twenty-five percent of nursing home residents had a length of stay of 13 days or less (1st quartile). Fifty percent of nursing home residents had a length of stay of 38 days or less (median). The average length of stay was 410 days.

Trends in Nursing Home Average and Median Lengths of Stay: Maryland, 1999-2003

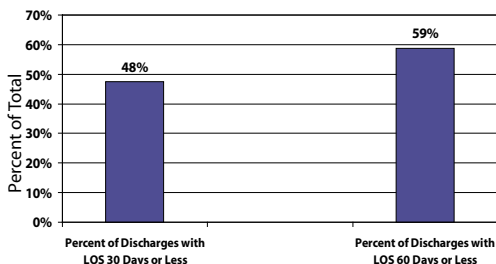


Both mean (average) and median lengths of nursing home stay have been decreasing as more short stay residents are admitted to nursing homes.



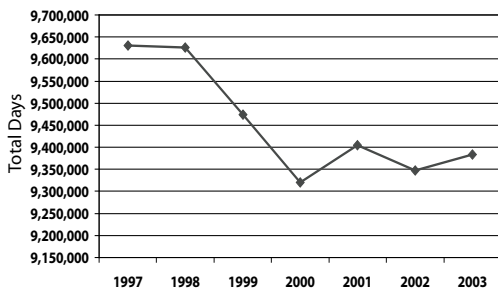
Percent of Discharges with Short Lengths of Stay: Maryland, 2003

Almost half of discharges from nursing homes in 2003 had lengths of stay of 30 days or less. Almost 60 percent of discharges had lengths of stay of 60 days or less.



Trends in Maryland Nursing Home Days of Care: 1997-2003

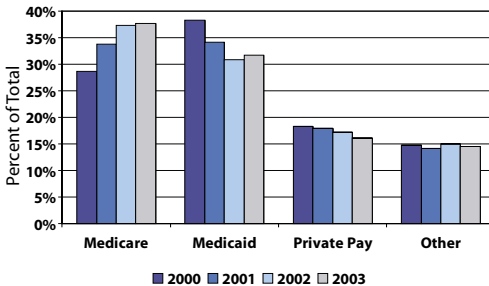
Nursing home days of care decreased noticeably between 1997 and 1999 then increased between 2000 and 2001. The total number of days of care has been relatively stable since 2001.



1999 data is extrapolated from other years.

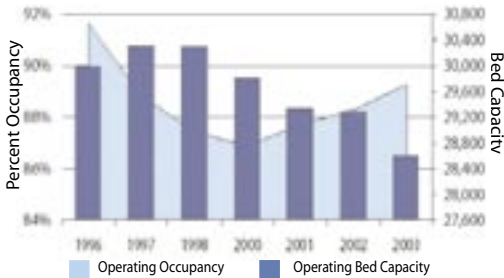


Percent of Maryland Nursing Home Residents by Payer Source on Admission, 2000-2003



The proportion of total nursing home residents whose care on admission was paid for by Medicare grew due, primarily, to the increased use of nursing homes as step down care for short stay residents between a hospital stay and discharge to home. There was a concomitant decrease in the proportion of nursing home residents who were either Medicaid or private pay on admission.

Trends in Maryland Nursing Home Occupancy and Bed Capacity: 1996-1998, 2000-2003



Nursing home occupancy declined between 1996 and 2000. As facilities decreased bed capacity, occupancy began to rebound in 2001. Preliminary data for 2003 show a two percent decline in the number of operating beds and an increase in occupancy from 88.3 percent to 89.3 percent.

**Resident Characteristics: Maryland and United States: Current Status, 2003**

Resident Characteristics	Maryland	U.S.
Average Facility Residents	105.09	89.58
Percent Current Residents by Payer Source		
Medicare	14.18%	12.12%
Medicaid	61.59%	65.88%
Other Payer	24.23%	22.00%
Percent Dependent in Activities of Daily Living for Current Residents		
Bathing	52.15%	37.39%
Dressing	45.37%	30.18%
Transferring	37.83%	26.15%
Toileting	46.34%	33.32%
Eating	24.07%	18.21%
Percent Incontinent of Bowel and Bladder for Current Residents		
Catheter	5.93%	6.48%
Bladder Incontinent	63.72%	55.19%
Bowel Incontinent	56.29	45.57
Toilet Training Program	13.45%	9.43%

Source: American Health Care Association; CMS OSCAR data surveys; December 2004; http://www.ahca.org/research/oscar_patient.htm



Facility Characteristics: Maryland and United States, 2003

Facility Characteristics	Maryland	U.S.
Ownership		
For Profit	62.08%	65.84%
Non-profit	35.00%	28.02%
Government	2.92%	6.14%
Certification		
Medicare Only	5.42%	5.44%
Medicaid Only	4.17%	7.21%
Medicare & Medicaid	90.42%	87.35%
Occupancy		
Occupancy for Certified Beds	86.54%	85.55%
Median Facility Occupancy	89.32%	88.33%

Source: American Health Care Association; CMS OSCAR data; December 2004; http://www.ahca.org/research/oscar_oper.htm



Technical Notes

Dependency in Selected Activities of Daily Living: Maryland and U.S., 2003

This measure summarizes dependency in three major activities of daily living (ADLs). The facilities were asked to rate each resident's ADLs on a scale of 1 to 3 from needs little or no assistance to needs extensive assistance. The three ADL scores were for those residents who needed assistance in: (1) eating, (2) toileting, and (3) transferring. A score of 1 was assigned to residents who were independent. A score of 2 was assigned to those that needed some supervision. A score of 3 was assigned to those who were dependent.

Each ADL score was multiplied by the number of residents in that category for each facility. An average composite score was developed by adding each of the three scores together and dividing by the total number of residents in the facility to compute each facility's index score. A summary case mix score ranging from 3-9 was compiled for each facility based on resident ADL characteristics. Individual facility scores were then summarized for each state.

Acuity Index Scores of Nursing Home Residents: Maryland and U.S., 2003

A composite case mix index for nursing facilities, developed by Thoms (1975) and used by Dor (1989), Cohen and Dubay (1990), and by Cowles (Health Data Associates 1994), was used to compare resident acuity. The approach constructed a casemix score by multiplying the proportion of residents with selected ADL limitations and selected resident problems times the estimated number of management minutes required for care of those selected problems, developed from a study of service requirements by Thoms (1975). Thus, a weighted score was multiplied by the percentage of residents in various categories as follows: completely bedfast times 46; needing assistance with ambulation times 32; needing full eating assistance times 45; needing some eating assistance times 20; having an indwelling catheter times 20; incontinent times 48; having decubitus ulcers times 20; receiving bowel or bladder retraining times 26; and receiving special skin care times 10. An index was constructed for each facility and then summarized to develop an average resident acuity at the state level.

Source: "Nursing Facilities, Staffing, Residents and Facility Deficiencies, 1997-2003", Department of Social & Behavioral Sciences, University of California San Francisco.



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